

MODEL ER-A770

Debitek Cash Card Installation Guide

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NOTICE TO USERS

This manual is intended to assist authorized Sharp dealers, with learning and understanding how to install and provide support in the utilization of the ER-A770 credit card authorization interface utilizing Debitex's card reader products. This assumes that you are familiar with the general programming concepts of the ER-A770. Please read this introductory section carefully as it will provide helpful hints and recommendations that will make your time more efficient and produce time saving results. This manual is not intended for end user customers of authorized Sharp dealers. Debitex is solely responsible for the card reader product and its documentation. Any information in this manual is subject to any instructions or information in Datacap's documentation.

OVERVIEW

The ER-A770 model POS terminals provide an interface for supporting the Debittek Card Reader unit. The primary configuration depicts that every POS terminal within the system will be connected to a card reader.

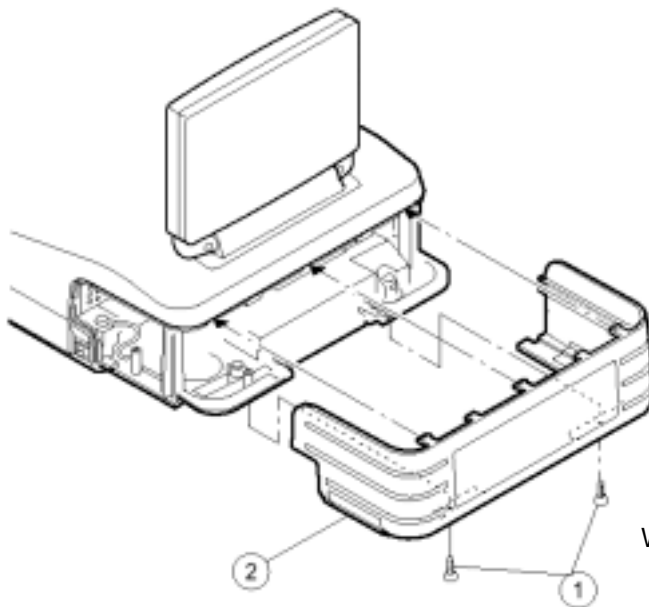
1. Types of Configurations:
 - 1) Standalone
 - 2) In Line
2. Key functions provided by the ER-A770:
 - 1) Full payment
 - 2) Partial payment
 - 3) Cash Card Ejection

EQUIPMENT CONNECTION

1. The ER-A770 Cash Card Connection:

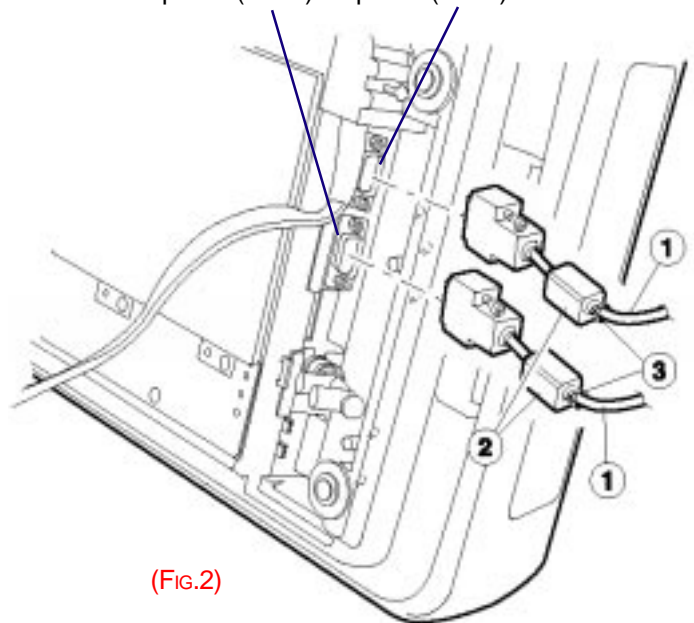
The ER-A770 provides two RS-232 communication ports standard with the possibility of adding the ER-A7RS optional RS-232 expansion board to increase the number of RS-232 ports to four maximum. The instructions provided within will be based on the standard configuration.

Connection for the Cash Card Reader may be attached to the ER-A770 as shown below in (Fig. 1 and Fig. 2):



(FIG.1)

When using the CAT/EFT function, the connection for the cable may be port-1 (CH-1) or port-2 (CH-2)



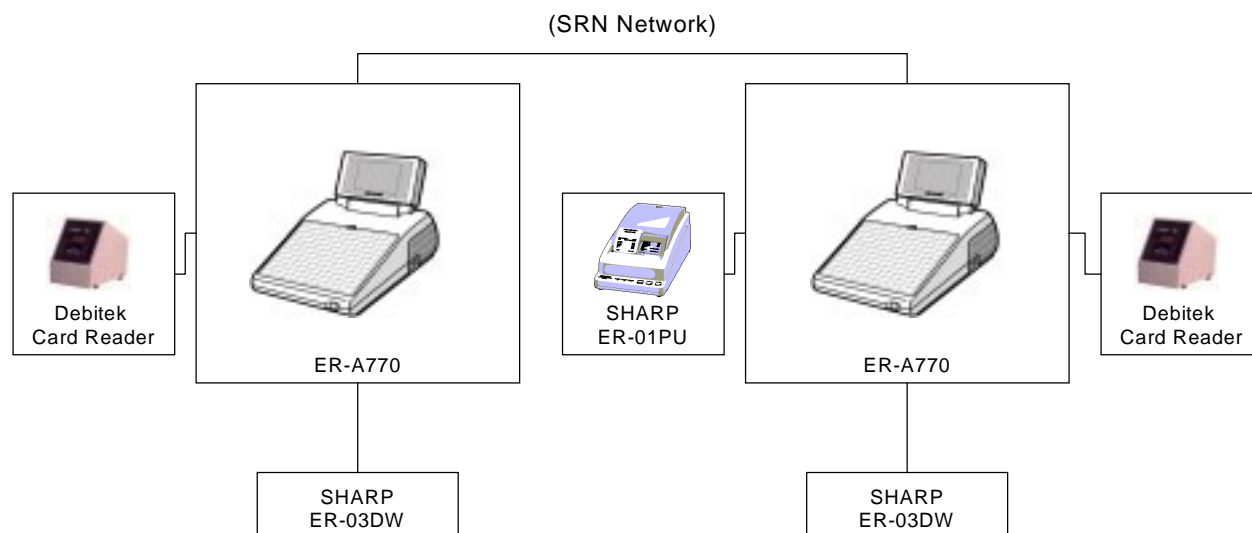
(FIG.2)

Note:

The extension cable for connection is provided with the Card Reader. For the specific pin outs, please call Debitex Customer Service.

2. System Configuration:

1) Block Diagram:



(Fig.3)

2) Equipment List:

EQUIPMENT LIST			
Provider	Standalone Config.	Model/Part No.	Qty
SHARP	POS terminal	ER-A770	1
	Cash Drawer	ER-03DW	1
	Memory Option * as required	UP-P02MB2 * as required	--
	2 Sta. Thermal Printer	ER-01PU	1
Local Procurement	Debitek Card Reader	KDCT-CR-SHARPER * Connection cables are included	1

Note: For InLine configurations as shown in (Fig. 3), each POS terminal will have a Cash Card Reader connected.

3) Debitex Accessory Items:

<u>Debitex Order Number</u>	<u>Description</u>
KHAR-DCT-PC-9	- (9 to 25) SHARP-to-Debitex connection cable
DOC-201001	- Set up document for the card reader
KDCS-3-64	- Data Collector/Programming device ***
KCRD-PCC-CT	- Cleaning cards
KAYS-CT3-E	- Spare Card Reader mechanism

*** Dealers who are placing their order for the very 1st time will not have this device.
The Data Collector/Programming device is essential for setting up the Debitex Card Reader System.

For further assistance, please contact your Debitex representative or contact Debitex directly by calling:

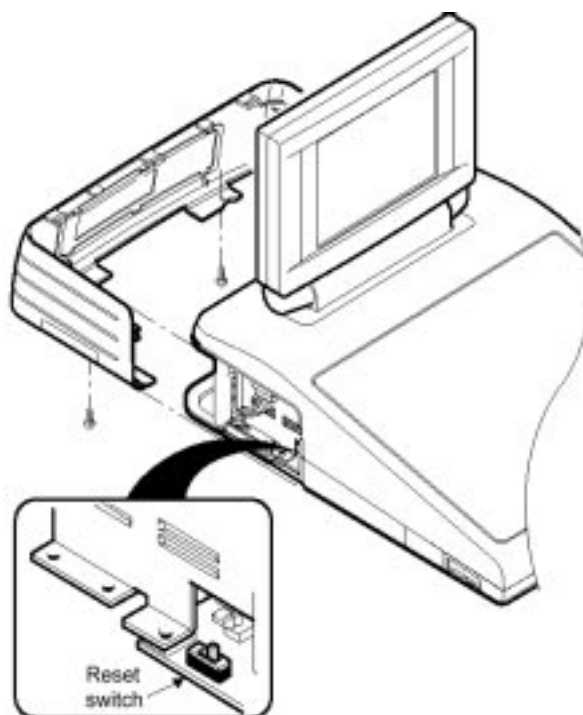
(423) 894 - 6177

RESET PROCEDURES

1. Program (SRV) Reset:

To perform a Program Reset, the Reset switch located beneath the back cover panel must be used. Please refer to (fig. 4) when performing the below key sequence.

- (1) Turn the AC power "OFF" using the power switch on the RH-side of the ER-A770.
- (2) Place the Reset Switch to the "ON" position (towards the rear).
- (3) Turn the AC power to the "ON" position.
(Please note that the display goes out)
- (4) Count for 5 seconds.
- (5) Place the Reset Switch to the "OFF" position (towards the front)
(Please note that the display becomes lit.)



(FIG.4)

Failure to adhere to one of the above procedures when instructed to do so may result in corrupt or broken RAM addressing

PROGRAMMING PRINCIPLES

1. Introduction:













The ER-A770 POS terminal may be interfaced with peripheral devices such as card readers as a method of sales transaction finalization. The different types of function and media keys to be included for the system setup are recommended below.

Please review this section carefully as it provides the recommended settings for the different methods for finalization sales transactions.

2. Programming Principles:

The ER-A770 incorporates the use of a programming keyboard sheet which is fixed while in SRV and PGM2 modes. While in these modes, there are certain keys that are used to make programming the ER-A770 easier to accomplish.

Please review the below list of function keys available while programming;

FUNCTION	DESCRIPTION
	The UP, DOWN, LEFT and RIGHT arrow keys are used to navigate within the specified menu and/or preset entry field.
	
	
	
	Used to scroll the programming window back to the previous page.
	Used to scroll the programming window to the next page.
	Used to "toggle" between fixed selections within a preset entry field when it is applicable.
	Used to "list" available fixed selections within a preset entry field when it is applicable.
	Used to "set" each preset entry field.
	Used to "finalize" each preset entry field.
	Used to clear the last setting you have programmed or clear an error state.
	Used to "cancel" programming and to return to the previous screen.

RECOMMENDED SEQUENCE FOR PROGRAMMING

1. Prior to Programming:

- 1) Always install the necessary options (i.e. Optional RAM, etc.) prior to programming.
- 2) Insure that the ER-A770 is installed with the proper ROM version using the chart below:

Model	ROM#	Description	Date	Label
ER-A770	ROM #1	770_1.ROM	05/2000	RAJ1A
	ROM #2	770_2.ROM		RAK1A
	ROM #1	770_1B.ROM	06/2001	RAJ1B
	ROM #2	770_2B.ROM		RAK1B

Note: The Debitek Cash Card will work with either version ROM object.

- 3) Start your programming sessions by executing one of the Master Reset operations.
(for detailed information about the Master Reset operations, please refer to the applicable Service Manual)

2. Recommended Sequence for programming:

Please complete the SRV-mode and PGM-mode sections in the order outlined below:

- 1) Always back up your existing program with the 02FD.EXE Utility prior to adding the programming for the Cash Card Reader.
- 2) Set the Device Configuration:
 - (a) CAT#2 or
 - (b) CAT#3
- 3) Set any applicable System Presets (SRV job #900 series).
- 4) Place the necessary Function keys on the keyboard (SRV job#950 Free Key).
- 5) Allocate any Memory Files (SRV job#970 series).
- 6) Perform a Program Reset (SRV Reset).
- 7) Set related presets in PGM2 mode.
 - (a) CAT Settings
 - (b) Media Key presets
 - (c) AUTO key programming
- 8) Remove unwanted function keys leaving the [AUTO] keys in place.
- 9) Conduct a Test with each of the finalization keys.
 - (a) Debit
 - (b) Partial Debit
 - (c) Eject Card

PROGRAM LIST

1. SRV Mode Related Jobs:

The below table represents the SRV mode jobs related to the Cash Card interface.

SRV Mode Related Jobs				
1. Device Assign				
	CAT#2	Channel No. settings		
	CAT#3	Channel No. settings		
2. JOB#900 System Presets				
	Job#	Bit	Description	Data
	906	A	Printing of Dept./PLU Codes Yes/No	4/0
			Entry which makes the PLU Stock Counter go Negative	2/1/0
			Inhibit/Allow with Error Indication/Allow unconditionally	
	916	B	Finalization by Charge Media when SBTL is <= 0 Yes/No	4/0
			----	---
			-----	---
3. JOB#950 Free Key				
	Func.#	Description		
	084	Auto key		
	085	Auto2 key		
	086	Auto3 key		
	114	Charge1 key		
	115	Charge2 key		
	117	Charge4 key		

2. PGM2 Mode Related Jobs:

The below table represents the PGM2 mode jobs related to the Cash Card interface.

PGM2 Mode Related Jobs				
1. CAT Setting				
Job#		Description	MRS Default	Recommended
CAT PRESET #2	Preset	Time Out1	010	005
		Time Out2	099	010
		Baud Rate	9600bps	9600bps
		Product Code	00000000	00000000
2. Media Settings				
Job#		Description	Data	
Charge	CH1	for full Debit	see details for selected parameters	
	CH2	for partial Debit	see details for selected parameters	
	CH4	for Card Ejection	see details for selected parameters	

SRV MODE PROGRAMMING

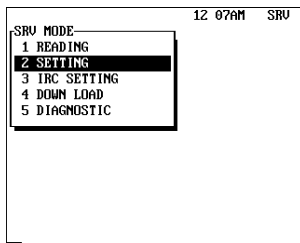
1. Device Configuration - CAT#2:

Place the ER-A770 into SRV mode:

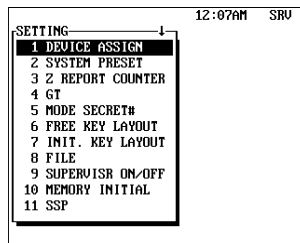
- 1) Select 2 SETTING
- 2) Select 1 DEVICE ASSIGN
- 3) Select 15 CAT#2
- 4) Set the Channel No. followed by depressing the [ENTER] key.

*Note: the RS-232 port which the Debitek Card Reader is physically connected (Refer to pg. 2).
*** for this example CH#1 is used.*

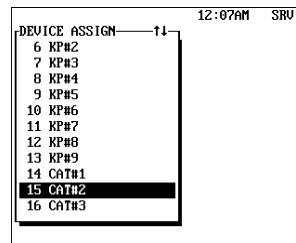
- 5) Depress [CANCEL] to exit to the SRV SETTING Sub-Menu.
- 6) Depress [CANCEL] again to exit to the SRV MODE Sub-Menu.
- 7) Depress [MODE] to exit to the REG MODE.



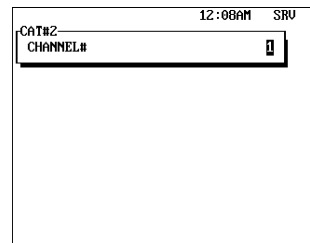
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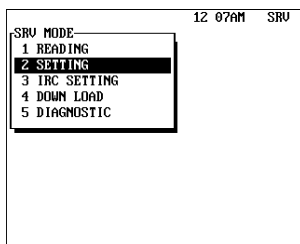
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2. SRV Mode System Presets:

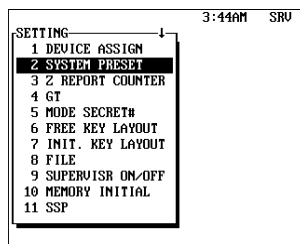
Place the ER-A770 into SRV mode;

- 1) Select 2 SETTING
- 2) Select 2 SYSTEM PRESET
- 3) Set the following values;

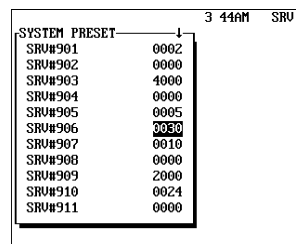
- a) Job#906: = 0xxx
- b) Job#916: = x4xx



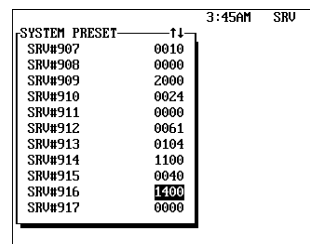
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

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3. Free Key Layout:

The Function keys required and the description for recommended usage are shown below:

<u>FUNCTION</u>	<u>DESCRIPTION</u>
	The AUTO key is preset for the Debit settlement key using CH1.
	The AUTO2 key is preset for the Partial Debit settlement key using CH2.
	The AUTO3 key is preset for the Card Ejection function using CH4.
	The CH1 key will be programmed for full Debit settlement which initiates the Card Reader.
	The CH2 key will be programmed for partial Debit settlement enforcing an amount entry which initiates the Card Reader.
	The CH4 key will be programmed to initiate the Card Reader to "EJECT" the card once depressed.
	The RFND key will be used when an error in entry has been made and will allow the amount to be restored onto the Cash Card.

Note: It is highly recommended that you place the usage of the REFUND key under Manager's control. For further details on how to incorporate Manager's control, please refer to the applicable Instruction Manual for Manager code and Optional presetting.

Note: It is important to note that "ONLY" the specified Charge media keys may be used.

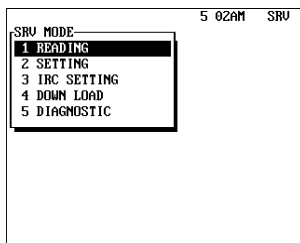
SRV MODE PROGRAMMING READOUT

1. System Presets:

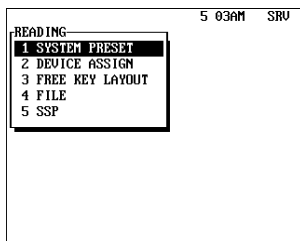
To obtain the System preset reading, please follow the below key sequence:

Place the SRV key in the SRV mode:

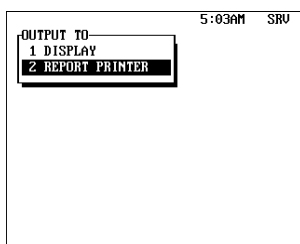
- 1) Select 1 READING
- 2) Select 1 SYSTEM PRESETS
- 3) Select 2 REPORT PRINTER
- 4) Once the report is printed, verify your settings.



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YOUR RECEIPT THANK YOU

10/01/2001 000001
#0133 7:45 PM

SYSTEM PRESETS

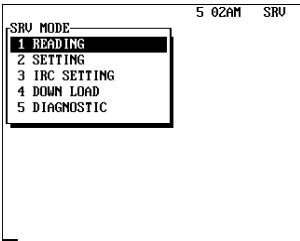
901#	0002
902#	0000
903#	4000
904#	0000
905#	0005
906#	0030
907#	0010
908#	0000
909#	2000
910#	0024
911#	0000
912#	0061
913#	0104
914#	1100
915#	0040
916#	1400
917#	0000
918#	2233
919#	5100
920#	2040
921#	0004
922#	0000
923#	0010
924#	1433
925#	0303
926#	0000
927#	0000
928#	0060
929#	0000
980#	0000
981#	4000
Z REPORT COUNTER	0000
TRANSACTION Z1	0000
TRANSACTION Z2	0000
:	
POSITIVE GT	\$000000000000.00
G T 2	
NEGATIVE GT	\$000000000000.00
G T 3	
TRAINING GT	\$000000000000.00
T R	
:	
AUTO KEY PGM	0000
REG MODE	0000
START UP	0000

2. Device Configuration:

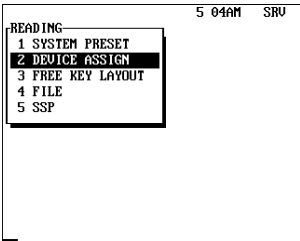
To obtain the Device Assignment preset reading, please follow the below key sequence:

Place the SRV key in the SRV mode:

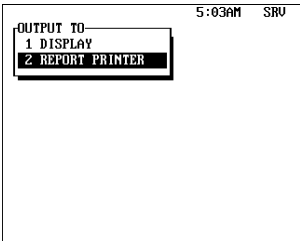
- 1) Select 1 READING
- 2) Select 2 DEVICE ASSIGN
- 3) Select 2 REPORT PRINTER
- 4) Once the report is printed, verify your settings.



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YOUR RECEIPT

THANK YOU

10/01/2001000001

#01347:46PM

DEVICE CONFIG

JPRINTER---

RPRINTER---

BILLPRINTER---

REPORTPRINTERT#000-C#2

YES

EPSON TM-U200

ONESHEET

KP#1---

KP#2---

KP#3---

KP#4---

KP#5---

KP#6---

KP#7---

KP#8---

KP#9---

CAT#1---

CAT#2C#1

CAT#3---

SCALE---

COIN DISP.---

ONLINE---

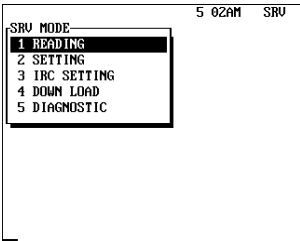
CVM DATA I/F---

3. Free Key Layout:

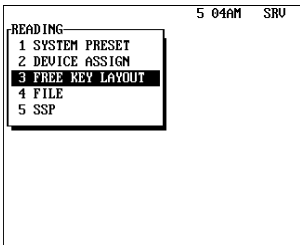
To obtain the Free Key Layout preset reading, please follow the below key sequence:

Place the SRV key in the SRV mode:

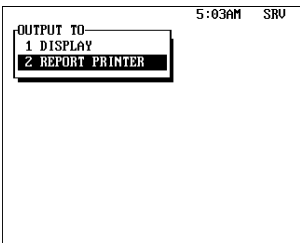
- 1) Select 1 READING
- 2) Select 6 FREE KEY LAYOUT
- 3) Select 2 REPORT PRINTER
- 4) Once the report is printed, verify your settings.



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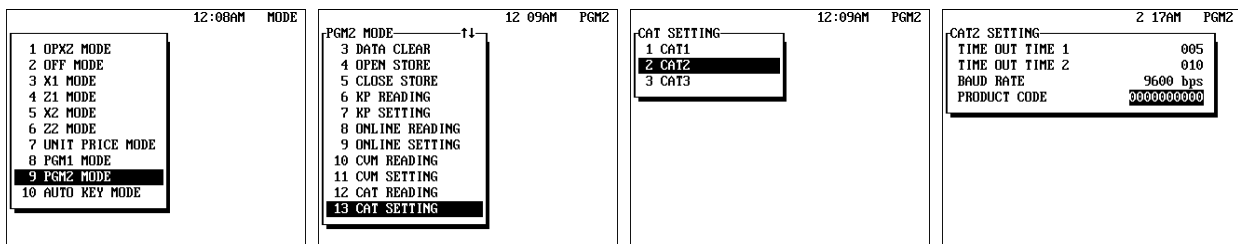
YOUR RECEIPT			
THANK YOU			
10/01/2001		000001	
#0135		7:47 PM	
FREE KEY LAYOUT			
001	0	KEY	109
002	1	KEY	110
003	2	KEY	122
004	3	KEY	134
005	4	KEY	111
006	5	KEY	123
007	6	KEY	135
008	7	KEY	112
009	8	KEY	124
010	9	KEY	136
011	00	KEY	121
012	000	KEY	---
013	.	KEY	133
014	CL		137
015	@/FOR		125
	:		
	:		
060	I.VOID		114
061	ST VD		126
062	RFND		141
	:		
	:		
084	AUTO		150
085	AUTO2		149
086	AUTO3		148
	:		
	:		
114	CH1		153
115	CH2		152
116	CH3		---
117	CH4		151
	:		
	:		
231	PMEN48		---
232	PMEN49		---
233	PMEN50		---

PGM2 MODE PROGRAMMING

1. CAT SETTINGS:

Entering the PGM2 mode may be achieved from the REG mode as follows:

- 1) Depress the [MODE] key
- 2) Select 9 PGM2 MODE
- 3) Select 13 CAT SETTING
- 4) Select 2 CAT2
- 5) Set the following values;
 - TIMEOUT TIME1 = 005
 - TIMEOUT TIME2 = 010
 - BAUD RATE = 9600 bps
 - PRODUCT CODE = 0000000000
- 6) Depress the [CA/AT] key when all settings are completed to exit to the CAT SETTING Sub-Menu.
- 7) Depress the [CANCEL] key to exit to the PGM2 Sub-Menu.



PROGRAMMING MEDIA KEYS

There are 3 different functions used in the Debitek Cash Card implementation. The functions are 1) Debit, 2) Partial Debit and 3) Eject. The specific Charge Media key is significant to the interface and should be preset exactly as indicated on the following pages.

IMPORTANT: Only the specified Charge media keys may be used for the Cash Card interface !!!

1. Debit Finalization Key:

Entering the PGM2 mode may be achieved from the REG mode as follows:

- 1) Depress the [MODE] key
- 2) Select 9 PGM2 MODE
- 3) Select 2 SETTING
- 4) Select 5 MEDIA
- 5) Select 3 CHARGE
- 6) Select 1 CHARGE1
- 7) Set the following related CH1 Media key's presets;

CH1 Media Key Related - Parameter Field Setting	Preset	Recommended Setting
Text (Gross)	CHARGE1	DEBIT
Text (Refund)	CHARGE1-	DEBIT-
Short Tender	Enable/Disable	Disable
CAT Operation	NON-COMPULSORY	CAT2 COMPULSORY
CAT2 Action Code	CHG-SALE	CHG-SALE
CAT2 Trans. Type	CH1	CH1
Card# Prt	Yes/No	No
Sign.Line Prt.	Yes/No	No
Card Holder Prt.	Yes/No	No
Expiration Prt.	Yes/No	No
Number of Rcpt	1-9	1
Change Due	Enable/Disable	Disable
Drawer Opening	Yes/No	No
Amount Entry	Inhibit/Compulsory	Inhibit

- 8) Depress [CA/AT] when all settings are completed to exit to the PGM2 Charge Sub-Menu.
- 9) Depress [CANCEL] to exit the Charge Sub-Menu and return to the Media preset menu.

12:00AM MODE

1	OPX2 MODE
2	OFF MODE
3	X1 MODE
4	Z1 MODE
5	X2 MODE
6	Z2 MODE
7	UNIT PRICE MODE
8	PGM1 MODE
9	PGM2 MODE
10	AUTO KEY MODE

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2 17AM PGM2

1	READING
2	SETTING
3	DATA CLEAR
4	OPEN STORE
5	CLOSE STORE
6	KP READING
7	KP SETTING
8	ONLINE READING
9	ONLINE SETTING
10	CUM READING
11	CUM SETTING

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2 18AM PGM2

1	ARTICLE
2	DIRECT KEY
3	PLU MENU KEY
4	FUNCTION
5	MEDIA
6	TEXT
7	PERSONNEL
8	TERMINAL
9	DATE/TIME
10	OPTIONAL
11	SECRET CODE

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2 18AM PGM2

1	CASH
2	CHECK
3	CHARGE
4	EMPL CHARGE
5	CONVERSION
6	EAT-IM
7	SERVICE
8	FINAL
9	CID
10	CH/CG
11	CA/CK

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2 18AM PGM2

1	CHARGE1
2	CHARGE2
3	CHARGE3
4	CHARGE4
5	CHARGE5
6	CHARGE6
7	CHARGE7
8	CHARGE8

⑤

2 19AM PGM2

CHARGE1	
TEXT(GROSS)	DEBIT
TEXT(REFUND)	DEBIT-
HALO	18
GLU/PBLU	ENABLE
SHORT TENDER	ENABLE
HEADER ON BILL	NO
FOOTER ON BILL	NO
CAT OPERATION	NON-COMPULSORY
CAT1 ACTION CODE	NOT TRANSMIT
CAT2 ACTION CODE	CHG-SALE
CAT2 TRANS. TYPE	CH1

⑥

2 19AM PGM2

CHARGE1	
TEXT(GROSS)	DEBIT
TEXT(REFUND)	DEBIT-
HALO	18
GLU/PBLU	ENABLE
SHORT TENDER	DISABLE
HEADER ON BILL	NO
FOOTER ON BILL	NO
CAT OPERATION	NON-COMPULSORY
CAT1 ACTION CODE	NOT TRANSMIT
CAT2 ACTION CODE	CHG-SALE
CAT2 TRANS. TYPE	CH1

⑦

2 20AM PGM2

CHARGE1	
TEXT(GROSS)	DEBIT
TEXT(REFUND)	DEBIT-
HALO	18
GLU/PBLU	ENABLE
SHORT TENDER	DISABLE
HEADER ON BILL	NO
FOOTER ON BILL	NO
CAT OPERATION	CAT2 COMPULSORY
CAT1 ACTION CODE	NOT TRANSMIT
CAT2 ACTION CODE	CHG-SALE
CAT2 TRANS. TYPE	CH1

⑧

2 20AM PGM2

CHARGE1	
TEXT(GROSS)	DEBIT
TEXT(REFUND)	DEBIT-
HALO	18
GLU/PBLU	ENABLE
SHORT TENDER	DISABLE
HEADER ON BILL	NO
FOOTER ON BILL	NO
CAT OPERATION	CAT2 COMPULSORY
CAT1 ACTION CODE	NOT TRANSMIT
CAT2 ACTION CODE	CHG-SALE
CAT2 TRANS. TYPE	CH1

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2:21AM PGM2

CHARGE1	
TEXT(GROSS)	DEBIT
TEXT(REFUND)	DEBIT-
HALO	18
GLU/PBLU	ENABLE
SHORT TENDER	DISABLE
HEADER ON BILL	NO
FOOTER ON BILL	NO
CAT OPERATION	CAT2 COMPULSORY
CAT1 ACTION CODE	NOT TRANSMIT
CAT2 ACTION CODE	CHG-SALE
CAT2 TRANS. TYPE	CH1

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2:21AM PGM2

CHARGE1	
CAT1 ACTION CODE	NOT TRANSMIT
CAT2 ACTION CODE	CHG-SALE
CAT2 TRANS. TYPE	CH1
CAT3 ACTION CODE	CHG-SALE
CAT3 TRANS. TYPE	CH1
CARD# PRT.	NO
CARD# FORMAT	PARTIAL
SIGN.LINE PRT.	NO
CARD HOLDER PRT.	NO
EXPIRATION PRT.	NO
NUMBER OF RCPT	1
CLOSED GC FILE	NO RETAINED
BILL PRINT	NON-COMPULSORY
FOOTER ON RCPT	NO
NON-ADD # ENTRY	NON-COMPULSORY
CHANGE DUE	DISABLE

⑪

3:00AM PGM2

CHARGE1	
CARD# PRT.	NO
CARD# FORMAT	PARTIAL
SIGN.LINE PRT.	NO
CARD HOLDER PRT.	NO
EXPIRATION PRT.	NO
NUMBER OF RCPT	1
CLOSED GC FILE	NO RETAINED
BILL PRINT	NON-COMPULSORY
FOOTER ON RCPT	NO
NON-ADD # ENTRY	NON-COMPULSORY
CHANGE DUE	DISABLE

⑫

3:00AM PGM2

CHARGE1	
NUMBER OF RCPT	1
CLOSED GC FILE	NO RETAINED
BILL PRINT	NON-COMPULSORY
FOOTER ON RCPT	NO
NON-ADD # ENTRY	NON-COMPULSORY
CHANGE DUE	DISABLE
TAXABLE1 DELETE	NO
TAXABLE2 DELETE	NO
TAXABLE3 DELETE	NO
TAXABLE4 DELETE	NO
DRAWER OPENING	NO

⑬

4:13AM PGM2

CHARGE1	
CLOSED GC FILE	NO RETAINED
BILL PRINT	NON-COMPULSORY
FOOTER ON RCPT	NO
NON-ADD # ENTRY	NON-COMPULSORY
CHANGE DUE	DISABLE
TAXABLE1 DELETE	NO
TAXABLE2 DELETE	NO
TAXABLE3 DELETE	NO
TAXABLE4 DELETE	NO
DRAWER OPENING	NO
AMOUNT ENTRY	INHIBIT

⑭

2. Partial Debit Finalization Key:

Entering the PGM2 mode may be achieved from the REG mode as follows;

- 1) Depress the [MODE] key
- 2) Select 9 PGM2 MODE
- 3) Select 2 SETTING
- 4) Select 5 MEDIA
- 5) Select 3 CHARGE
- 6) Select 2 CHARGE2
- 7) Set the following related CH2 Media key's presets:

CH2 Media Key Related - Parameter Field Setting	Preset	Recommended Setting
Text (Gross)	CHARGE2	PARTIAL
Text (Refund)	CHARGE2-	PARTIAL-
Short Tender	Enable/Disable	Enable
CAT Operation	NON-COMPULSORY	CAT2 COMPULSORY
CAT2 Action Code	CHG-SALE	CHG-SALE
CAT2 Trans. Type	CH2	CH2
Card# Prt	Yes/No	No
Sign.Line Prt.	Yes/No	No
Card Holder Prt.	Yes/No	No
Expiration Prt.	Yes/No	No
Number of Rcpt	1-9	1
Change Due	Enable/Disable	Disable
Drawer Opening	Yes/No	No
Amount Entry	Inhibit/Compulsory	Compulsory

- 8) Depress [CA/AT] when all settings are completed to exit to the PGM2 Charge Sub-Menu.
- 9) Depress [CANCEL] to exit the Charge Sub-Menu and return to the Media preset menu.

12:00AM MODE

1	OPX2 MODE
2	OFF MODE
3	X1 MODE
4	Z1 MODE
5	X2 MODE
6	Z2 MODE
7	UNIT PRICE MODE
8	PGM1 MODE
9	PGM2 MODE
10	AUTO KEY MODE

①

2 17AM PGM2

1	READING
2	SETTING
3	DATA CLEAR
4	OPEN STORE
5	CLOSE STORE
6	KP READING
7	KP SETTING
8	ONLINE READING
9	ONLINE SETTING
10	CUM READING
11	CUM SETTING

②

2 18AM PGM2

1	ARTICLE
2	DIRECT KEY
3	PLU MENU KEY
4	FUNCTION
5	MEDIA
6	TEXT
7	PERSONNEL
8	TERMINAL
9	DATE/TIME
10	OPTIONAL
11	SECRET CODE

③

2 18AM PGM2

1	CASH
2	CHECK
3	CHARGE
4	EMPL CHARGE
5	CONVERSION
6	EAT-IM
7	SERVICE
8	FINAL
9	CID
10	CH/CG
11	CA/CK

④

2:22AM PGM2

1	CHARGE1
2	CHARGE2
3	CHARGE3
4	CHARGE4
5	CHARGE5
6	CHARGE6
7	CHARGE7
8	CHARGE8

⑤

2:23AM PGM2

TEXT(GROSS)	PARTIAL
TEXT(REFUND)	PARTIAL
HALO	18
GLU/PBLU	ENABLE
SHORT TENDER	ENABLE
HEADER ON BILL	NO
FOOTER ON BILL	NO
CAT OPERATION	NON-COMPULSORY
CAT1 ACTION CODE	NOT TRANSMIT
CAT2 ACTION CODE	CHG-SALE
CAT2 TRANS. TYPE	CH2

⑥

2 23AM PGM2

TEXT(GROSS)	PARTIAL
TEXT(REFUND)	PARTIAL
HALO	18
GLU/PBLU	ENABLE
SHORT TENDER	ENABLE
HEADER ON BILL	NO
FOOTER ON BILL	NO
CAT OPERATION	NON-COMPULSORY
CAT1 ACTION CODE	NOT TRANSMIT
CAT2 ACTION CODE	CHG-SALE
CAT2 TRANS. TYPE	CH2

⑦

2:24AM PGM2

TEXT(GROSS)	PARTIAL
TEXT(REFUND)	PARTIAL
HALO	18
GLU/PBLU	ENABLE
SHORT TENDER	ENABLE
HEADER ON BILL	NO
FOOTER ON BILL	NO
CAT OPERATION	CAT2 COMPULSORY
CAT1 ACTION CODE	NOT TRANSMIT
CAT2 ACTION CODE	CHG-SALE
CAT2 TRANS. TYPE	CH2

⑧

2:24AM PGM2

TEXT(GROSS)	PARTIAL
TEXT(REFUND)	PARTIAL
HALO	18
GLU/PBLU	ENABLE
SHORT TENDER	ENABLE
HEADER ON BILL	NO
FOOTER ON BILL	NO
CAT OPERATION	CAT2 COMPULSORY
CAT1 ACTION CODE	NOT TRANSMIT
CAT2 ACTION CODE	CHG-SALE
CAT2 TRANS. TYPE	CH2

⑨

2:24AM PGM2

TEXT(GROSS)	PARTIAL
TEXT(REFUND)	PARTIAL
HALO	18
GLU/PBLU	ENABLE
SHORT TENDER	ENABLE
HEADER ON BILL	NO
FOOTER ON BILL	NO
CAT OPERATION	CAT2 COMPULSORY
CAT1 ACTION CODE	NOT TRANSMIT
CAT2 ACTION CODE	CHG-SALE
CAT2 TRANS. TYPE	CH2

⑩

2 25AM PGM2

CAT1 ACTION CODE	NOT TRANSMIT
CAT2 ACTION CODE	CHG-SALE
CAT2 TRANS. TYPE	CH2
CAT3 ACTION CODE	CHG-SALE
CAT3 TRANS. TYPE	CH2
CARD# PRT.	NO
CARD# FORMAT	PARTIAL
SIGN.LINE PRT.	NO
CARD HOLDER PRT.	NO
EXPIRATION PRT.	NO
NUMBER OF RCPT	1
CLOSED GC FILE	NO RETAINED
BILL PRINT	NON-COMPULSORY
FOOTER ON RCPT	NO
NON-ADD # ENTRY	NON-COMPULSORY
CHANGE DUE	DISABLE

⑪

4 15AM PGM2

CARD# PRT.	NO
CARD# FORMAT	PARTIAL
SIGN.LINE PRT.	NO
CARD HOLDER PRT.	NO
EXPIRATION PRT.	NO
NUMBER OF RCPT	1
CLOSED GC FILE	NO RETAINED
BILL PRINT	NON-COMPULSORY
FOOTER ON RCPT	NO
NON-ADD # ENTRY	NON-COMPULSORY
CHANGE DUE	DISABLE

⑫

4 15AM PGM2

NUMBER OF RCPT	1
CLOSED GC FILE	NO RETAINED
BILL PRINT	NON-COMPULSORY
FOOTER ON RCPT	NO
NON-ADD # ENTRY	NON-COMPULSORY
CHANGE DUE	DISABLE
TAXABLE1 DELETE	NO
TAXABLE2 DELETE	NO
TAXABLE3 DELETE	NO
TAXABLE4 DELETE	NO
DRAWER OPENING	NO

⑬

3:02AM PGM2

CLOSED GC FILE	NO RETAINED
BILL PRINT	NON-COMPULSORY
FOOTER ON RCPT	NO
NON-ADD # ENTRY	NON-COMPULSORY
CHANGE DUE	ENABLE
TAXABLE1 DELETE	NO
TAXABLE2 DELETE	NO
TAXABLE3 DELETE	NO
TAXABLE4 DELETE	NO
DRAWER OPENING	YES
AMOUNT ENTRY	COMPULSORY

⑭

3. Card Ejection Key:

Entering the PGM2 mode may be achieved from the REG mode as follows;

- 1) Depress the [MODE] key
- 2) Select 9 PGM2 MODE
- 3) Select 2 SETTING
- 4) Select 5 MEDIA
- 5) Select 3 CHARGE
- 6) Select 4 CHARGE4
- 7) Set the following related CH4 Media key's presets:

CH2 Media Key Related - Parameter Field Setting	Preset	Recommended Setting
Text (Gross)	CHARGE4	EJECT
Text (Refund)	CHARGE4-	EJECT-
Short Tender	Enable/Disable	Disable
CAT Operation	NON-COMPULSORY	CAT2 COMPULSORY
CAT2 Action Code	CHG-SALE	CHG-SALE
CAT2 Trans. Type	CH4	CH4
Card# Prt	Yes/No	No
Sign.Line Prt.	Yes/No	No
Card Holder Prt.	Yes/No	No
Expiration Prt.	Yes/No	No
Number of Rcpt	1-9	1
Change Due	Enable/Disable	Disable
Drawer Opening	Yes/No	No
Amount Entry	Inhibit/Compulsory	Inhibit

- 8) Depress [CA/AT] when all settings are completed to exit to the PGM2 Charge Sub-Menu.
- 9) Depress [CANCEL] to exit the Charge Sub-Menu and return to the Media preset menu.

12:00AM MODE

1	OPX2 MODE
2	OFF MODE
3	X1 MODE
4	Z1 MODE
5	X2 MODE
6	Z2 MODE
7	UNIT PRICE MODE
8	PGM1 MODE
9	PGM2 MODE
10	AUTO KEY MODE

①

2 17AM PGM2

1	READING
2	SETTING
3	DATA CLEAR
4	OPEN STORE
5	CLOSE STORE
6	KP READING
7	KP SETTING
8	ONLINE READING
9	ONLINE SETTING
10	CUM READING
11	CUM SETTING

②

2 18AM PGM2

1	ARTICLE
2	DIRECT KEY
3	PLU MENU KEY
4	FUNCTION
5	MEDIA
6	TEXT
7	PERSONNEL
8	TERMINAL
9	DATE/TIME
10	OPTIONAL
11	SECRET CODE

③

2 18AM PGM2

1	CASH
2	CHECK
3	CHARGE
4	EMPL CHARGE
5	CONVERSION
6	EAT-IM
7	SERVICE
8	FINAL
9	CID
10	CH/CG
11	CA/CK

④

9:18AM PGM2

1	CHARGE1
2	CHARGE2
3	CHARGE3
4	CHARGE4
5	CHARGE5
6	CHARGE6
7	CHARGE7
8	CHARGE8

⑤

2:27AM PGM2

TEXT(GROSS)	EJECT
TEXT(REFUND)	EJECT
HALO	18
GLU/PBLU	ENABLE
SHORT TENDER	ENABLE
HEADER ON BILL	NO
FOOTER ON BILL	NO
CAT OPERATION	NON-COMPULSORY
CAT1 ACTION CODE	NOT TRANSMIT
CAT2 ACTION CODE	CHG-SALE
CAT2 TRANS. TYPE	CH4

⑥

2 27AM PGM2

TEXT(GROSS)	EJECT
TEXT(REFUND)	EJECT
HALO	18
GLU/PBLU	ENABLE
SHORT TENDER	DISABLE
HEADER ON BILL	NO
FOOTER ON BILL	NO
CAT OPERATION	NON-COMPULSORY
CAT1 ACTION CODE	NOT TRANSMIT
CAT2 ACTION CODE	CHG-SALE
CAT2 TRANS. TYPE	CH4

⑦

2:27AM PGM2

TEXT(GROSS)	EJECT
TEXT(REFUND)	EJECT
HALO	18
GLU/PBLU	ENABLE
SHORT TENDER	DISABLE
HEADER ON BILL	NO
FOOTER ON BILL	NO
CAT OPERATION	CAT2 COMPULSORY
CAT1 ACTION CODE	NOT TRANSMIT
CAT2 ACTION CODE	CHG-SALE
CAT2 TRANS. TYPE	CH4

⑧

2 28AM PGM2

TEXT(GROSS)	EJECT
TEXT(REFUND)	EJECT
HALO	18
GLU/PBLU	ENABLE
SHORT TENDER	DISABLE
HEADER ON BILL	NO
FOOTER ON BILL	NO
CAT OPERATION	CAT2 COMPULSORY
CAT1 ACTION CODE	NOT TRANSMIT
CAT2 ACTION CODE	CHG-SALE
CAT2 TRANS. TYPE	CH4

⑨

2:28AM PGM2

TEXT(GROSS)	EJECT
TEXT(REFUND)	EJECT
HALO	18
GLU/PBLU	ENABLE
SHORT TENDER	DISABLE
HEADER ON BILL	NO
FOOTER ON BILL	NO
CAT OPERATION	CAT2 COMPULSORY
CAT1 ACTION CODE	NOT TRANSMIT
CAT2 ACTION CODE	CHG-SALE
CAT2 TRANS. TYPE	CH4

⑩

2 30AM PGM2

CAT1 ACTION CODE	NOT TRANSMIT
CAT2 ACTION CODE	CHG-SALE
CAT2 TRANS. TYPE	CH4
CAT3 ACTION CODE	CHG-SALE
CAT3 TRANS. TYPE	CH4
CARD# PRT.	NO
CARD# FORMAT	PARTIAL
SIGN. LINE PRT.	NO
CARD HOLDER PRT.	NO
EXPIRATION PRT.	NO
NUMBER OF RCPT	1

⑪

4:16AM PGM2

NUMBER OF RCPT	1
CLOSED GC FILE	NO RETAINED
BILL PRINT	NON-COMPULSORY
FOOTER ON RCPT	NO
NON-ADD # ENTRY	NON-COMPULSORY
CHANGE DUE	DISABLE
TAXABLE1 DELETE	NO
TAXABLE2 DELETE	NO
TAXABLE3 DELETE	NO
TAXABLE4 DELETE	NO
DRAWER OPENING	NO

⑫

4 16AM PGM2

CLOSED GC FILE	NO RETAINED
BILL PRINT	NON-COMPULSORY
FOOTER ON RCPT	NO
NON-ADD # ENTRY	NON-COMPULSORY
CHANGE DUE	DISABLE
TAXABLE1 DELETE	NO
TAXABLE2 DELETE	NO
TAXABLE3 DELETE	NO
TAXABLE4 DELETE	NO
DRAWER OPENING	NO
AMOUNT ENTRY	INHIBIT

⑬

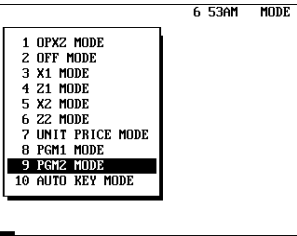
MEDIA KEY PROGRAMMING READOUT

1. Key Sequence:

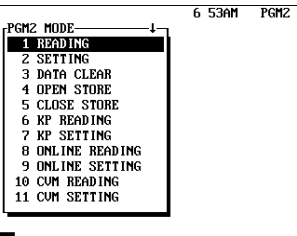
To obtain the media key preset reading, please follow the below key sequence:

Entering the PGM2 mode may be achieved from the REG mode as follows:

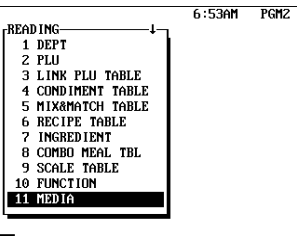
- 1) Depress the [MODE] key
- 2) Select 9 PGM2 MODE
- 3) Select 1 READING
- 4) Select 11 MEDIA
- 5) Select 2 REPORT PRINTER
- 6) Once the report is printed, verify your settings.



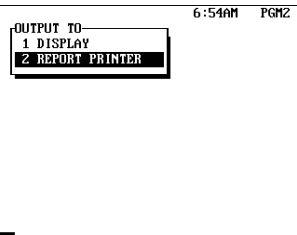
①



②



③



④

10/01/2001		000001
#0137		7:45PM
* P G M 2 *		
M E D I A		
CASH	KP0000 L18	00000000000000
	CA1 CA1	0000000001
CASH2	KP0000 L18	00000000000000
	CA2 CA2	0000000001
CHECK1	KP0000 L18	00000000000000
	CK1 CK1	0000000001
	:	
	:	
DEBIT	KP0000 L18	010000001000010
DEBIT-	CH1 CH1	2000101111
	KP0000 L18	000000001000001
PARTIAL	CH2 CH2	2000101111
PARTIAL-	:	
	:	
EJECT	KP0000 L18	010000001000010
EJECT-	CH4 CH4	2000101111
	:	
	:	
****CID		9999999.99
CHK/CG		999999.99

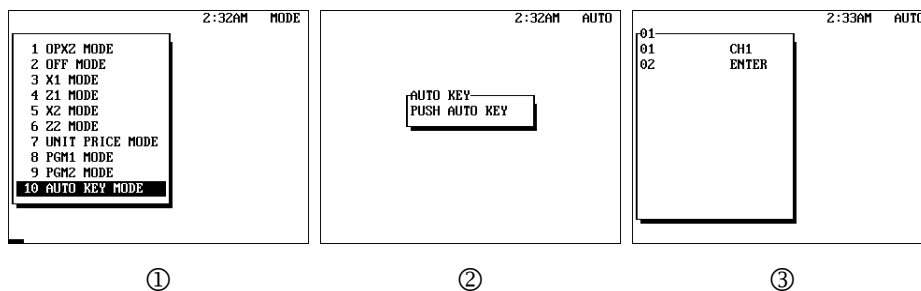
PROGRAMMING AUTO KEYS

Because the Cash Card is utilizing the credit card authorization interface, it is necessary to utilize the AUTO Sequence function keys to automatically depress the [ENTER] key when the "SWIPE CARD" prompt appears in the display.

1. AUTO key - Debit Finalization Key:

Entering PGM2 mode may be achieved from the REG mode as follows:

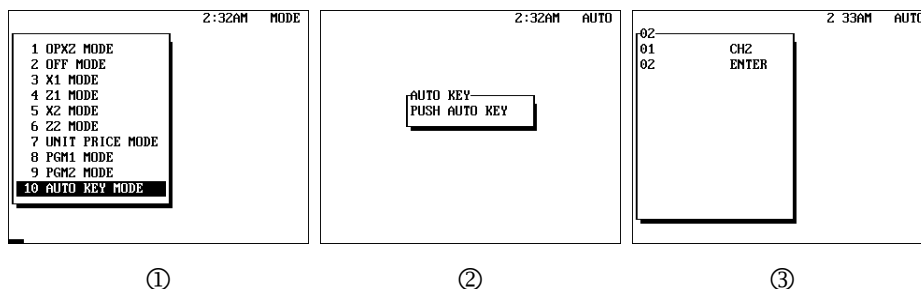
- 1) Depress the [MODE] key
- 2) Select 10 AUTO KEY MODE
- 3) Depress the [AUTO] key
- 4) Depress the [CH1] key
- 5) Depress the [ENTER] key
- 6) Depress the [AUTO] key
- 7) Depressing the [CANCEL] key will return the ER-A770 to the REG-mode



2. AUTO key - Partial Debit Finalization Key:

Entering PGM2 mode may be achieved from the REG mode as follows:

- 1) Depress the [MODE] key
- 2) Select 10 AUTO KEY MODE
- 3) Depress the [AUTO2] key
- 4) Depress the [CH2] key
- 5) Depress the [ENTER] key
- 6) Depress the [AUTO2] key
- 7) Depressing the [CANCEL] key will return the ER-A770 to the REG-mode



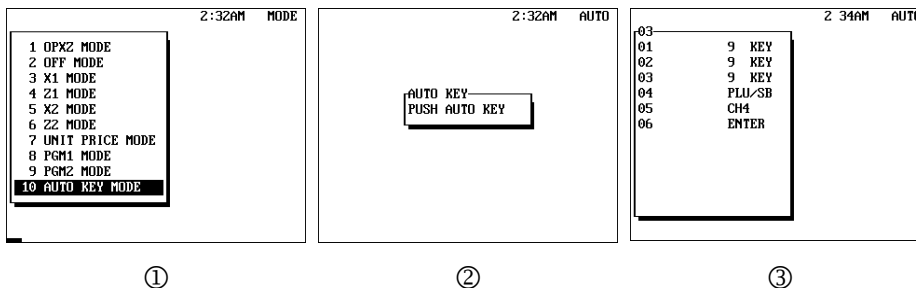
3. AUTO key - Eject Card Key:

Prior to creating this Auto key for ejecting the card, it is necessary to also create a zero-priced PLU which will become part of the Auto sequence entry to the Charge-4 media key.

In this case, it is assumed that the PLU code 999 has been previously set as a zero-priced PLU.

Entering the PGM2 mode may be achieved from the REG mode as follows:

- 1) Depress the [MODE] key
- 2) Select 10 AUTO KEY MODE
- 3) Depress the [AUTO3] key
- 4) Enter the PLU code "999"
- 5) Depress the [PLU/SB] key
- 6) Depress the [CH4] key
- 5) Depress the [ENTER] key
- 6) Depress the [AUTO3] key
- 7) Depressing the [CANCEL] key will return the ER-A770 to the REG-mode



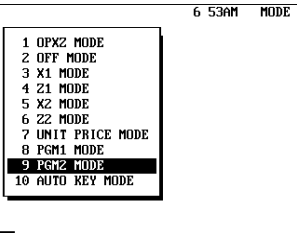
AUTO KEY PROGRAMMING READOUT

1. Key Sequence:

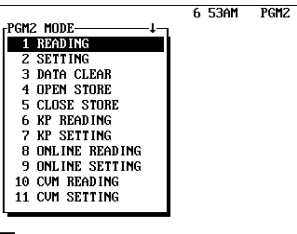
To obtain the Auto key preset reading, please follow the below key sequence:

Entering PGM2 mode may be achieved from the REG mode as follows:

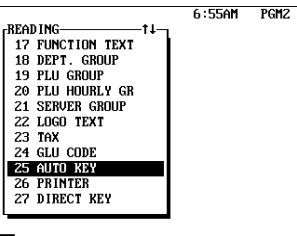
- 1) Depress the [MODE] key
- 2) Select 9 PGM2 MODE
- 3) Select 1 READING
- 4) Select 25 AUTO KEY
- 5) Select 2 REPORT PRINTER
- 6) Once the report is printed, verify your settings.



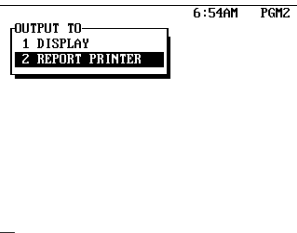
①



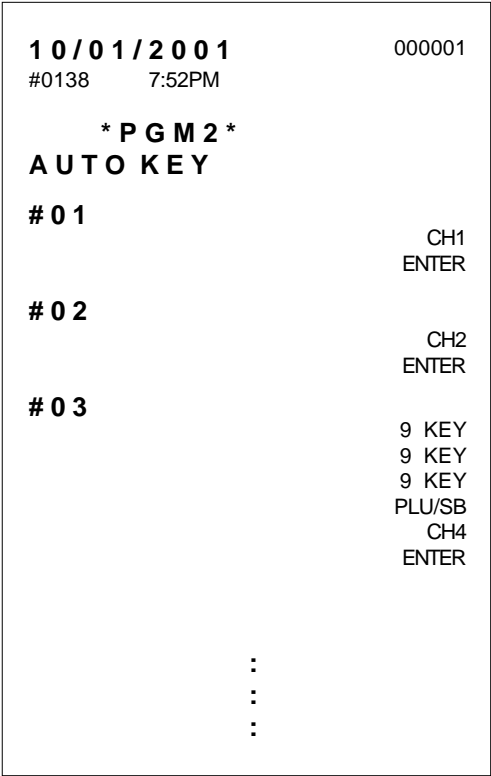
②



③



④

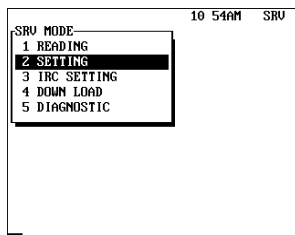


FINAL STAGES

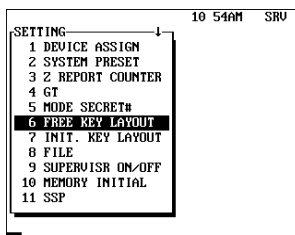
During SRV-mode programming the [CH1], [CH2] and [CH4] keys were placed directly onto the keyboard to be accessed during the Auto key presetting. Now that the Auto keys have been preset, it is recommended that the above mentioned function keys be removed from the keyboard assignment.

Place the ER-A770 into SRV mode:

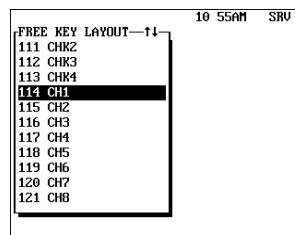
- 1) Select 2. SETTING
- 2) Select 6. FREE KEY
- 3) Select 114. CH1
- 4) Depress the [@/FOR] key to remove the [CH1] key.
- 5) Select 115. CH2
- 6) Depress the [@/FOR] key to remove the [CH2] key.
- 7) Select 117. CH4
- 8) Depress the [@/FOR] key to remove the [CH4] key.
- 9) Depress the [CA/AT] when all settings are completed to return to the SETTING Main-Menu.
- 10) Depress the [MODE] key to return the REG-mode.



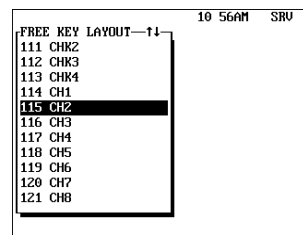
①



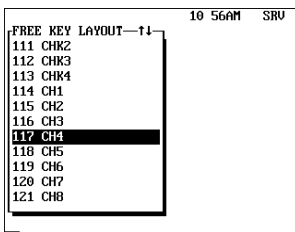
②



③



④



⑤

Notes:

1. When selecting the [CH1], [CH2] and [CH4] function keys during SRV Job #950, use the [UP] and [DOWN] arrow keys.
2. When the [@/FOR] key is depressed to remove the highlighted function key, the ER-A770 will automatically highlight the next function key.

QUICK SET UP

The following table will show the summarized quick set up procedure for the ER-A770. It is assumed that the Debitex Card Reader has been received with the correct ECR parameters loaded.

ECR Mode	No.	Action	Related Preset
Off	1	Install all Options (ROM/RAM, etc.)	
	2	Connect all Peripherals (i.e. Debitex, etc.)	
SRV	3	Master Reset <i>*** MRS-1 is described for this example</i>	MRS-1: AC Power to "OFF", place the RESET switch to the "ON" position, AC power to "ON", place the RESET switch to the "OFF" position while depressing [RECEIPT] feed key, enter the PASSWORD.
	4	Set Device Assign	2 SETTING, 1 DEVICE ASSIGN, 15 CAT#2, enter CH#. (0-7)
	5	Set System Presets	2 SETTING, 2 SYSTEM PRESETS, JOB#906 = 0xxx, JOB#916 = x4xx
	6	Set Free Key Layout	2 SETTING, 6 FREE KEY, FUNC#084, 085, 086, 114, 115 and 117
PGM2	7	Set CAT#2 presets	15 CAT SETTING, 2 CAT2, preset TIME OUT1 and TIME OUT2
	8	Set Media Key presets	2 SETTING, 5 MEDIA, 3 CHARGE, 1 CHARGE1, 2 CHARGE2 and 4 CHARGE4
	9	Set Auto Key presets	Auto = CH1, ENTER Auto2 = CH2, ENTER Auto3 = 999, PLU/SB, CH4, ENTER
SRV	10	Remove unwanted function keys - Free Key	2 SETTING, 6 FREE KEY, FUNC#114, 115 and 117



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